



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------|------------------|
| 10/563,506 | 04/04/2006 | Peter James Branton | RD 446 | 8289 |
| 22884 7590 10/26/2010 MIDDLETON & REUTLINGER 2500 BROWN & WILLIAMSON TOWER (401 S. 4th Street, Suite 2500) LOUISVILLE, KY 40202 | | | | |
| EXAMINER | | | | |
| LOPEZ, CARLOS N | | | | |
| ART UNIT | | PAPER NUMBER | | |
| 1747 | | | | |
| NOTIFICATION DATE | | DELIVERY MODE | | |
| 10/26/2010 | | ELECTRONIC | | |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

USPTOmail@MiddReut.com

Office Action Summary

Application No.

10/563,506

Applicant(s)

BRANTON ET AL.

Examiner

CARLOS LOPEZ

Art Unit

1747

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 8/27/10.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 41-78 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 41-56, 58-61, 63-75, 77 and 78 is/are rejected.
- 7) ☒ Claim(s) 57, 62 and 76 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB-06)
Paper No(s)/Mail Date _____

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

Claim Objection

Claim 76 is objected under 37 CFR 1.75 as being a substantial duplicate of claim 57. When two claims in an application are duplicates or else are so close in content that they both cover the same thing, despite a slight difference in wording, it is proper after allowing one claim to object to the other as being a substantial duplicate of the allowed claim. See MPEP § 706.03(k).

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 67 and 70 rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Claim 67 depends on cancelled claim 4. For examination purposes, claim 67 will be read as limiting the plug to cellulose acetate, plastic or metal.

The phrase "said at least additional portion" in claim 70 lacks antecedent basis.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 41-56, 58-61, 63-75, and 77-78 are rejected under 35 U.S.C. 103(a) as being unpatentable over EP 0664964 ('964) in view of Crellin et al (US 3,894,545).

Figure 4 of '964 discloses a smoke filter comprising the following: a first portion 19 being closed by barrier 21, a second portion 40 allowing smoke to pass through (See Page 5, lines 40-41 of '964), and the first and second portion being separated by barrier 100 that is permeable to vapor phase of the tobacco smoke to prevent contamination of the adsorbent material forming first portion 19 (See Page 5, lines 37). '964 is silent disclosing the pore size of the barrier that allows the vapor phase of the tobacco smoke into first portion 19. However, as noted by Crellin the purposes of providing a barrier between a first and second portion is to prevent smoke particles from contaminating the adsorbent material (carbon) of the first portion. (See Crellin Col. 2, lines 14-20)

In view that the prior art uses a barrier to block smoke particles from contacting the first portion, it would have been obvious to a person of ordinary skill in the art to have conducted routine experimentation to determine the pore size of the barrier. This routine experimentation would allow for making a barrier that allows for the exclusion of vapor smoke components (particles) so that the filter material of the first portion is not contaminated by these particles filtered out by the barrier. Consequently, the claimed pore size of barrier 100 would have been within the grasp of a person of ordinary skill in the art that would have been arrived by routine experimentation.

As for claims 42, see above.

As for claims 43-44, the wrapper as taught by Crellin in Col. 1, lines 65-68, the barrier is formed of cellulose acetate which is flexible.

As for claims 45-48, the absorbent used is granular carbon. (See Crellin Col. 3, lines 1-5)

As for claims claim 49-55, it is obvious to substitute a general adsorbent such as carbon with more selective adsorbent in combination with catalyst in order to reduce any impact it may have the flavor of the cigarette.

As for claims 58-59, second portion of '964 is made of cellulose acetate.

As for claims 60-61, see figure 4 of '964 showing the claimed arrangement.

As for claims 63-64, the first portion of '964 is a single piece, making the single piece into separable part as required by claim 62 would have been obvious to a person of ordinary skill in the art because it would still provide a filter of the tobacco smoke.

As for claims 65-67, the closed portion is formed by barrier 21 of '964 in order to prevent the flow of smoke which would indicate materials such as plastic, metal or cellulose acetate to form a high pressure drop would be used.

As for claims 56, 68-69, the claimed additional portion is deemed as tipping paper 30 shown in figure 4.

As for claim 70, see above referring to the claimed additional portion as barrier 21.

As for claim 71, tipping paper is conventionally made of cellulose acetate.

As for claim 72, see figure 4 showing tobacco rod 20.

As for claims 73-75, smoking material conventionally includes flavorants in encapsulated or free form.

Allowable Subject Matter

Claims 57 and 62 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

Applicant's arguments filed 8/27/10 have been fully considered but they are not persuasive.

Applicant argues that there is no teaching, suggestion or motivation in Crellin to use Applicant's material and pore size because Crellin discloses the use of porous paper which is in contrast to the claimed invention of using a polymer having the claimed pore size.

Crellin discloses two types of materials for which to make the barrier; either porous paper or cellulose acetate (a polymer). Applicant's declaration and arguments focus on Crellin's use of paper. However, the rejection above focuses on the alternate embodiment by Crellin which uses polymer (the limitation claimed by applicant) not paper which is not part of the claimed invention; see rejection of claims 43-44 noting the use of cellulose acetate as the claimed barrier. Therefore, it is not clear how arguments directed to an alternate embodiment used by Crellin, but not the basis of the current rejection, provides a rebuttal for the prima facie case of obviousness noted above.

Applicant's declaration further provides that it is not considered "practical to provide pores in paper which have a diameter of less than .1 μ m." However, while Crellin does not disclose the pore size of paper that is being used as a filtering material, applicant is referred to Pall et al US 3,238,056 which shows that paper used as filtering

material may have pore sizes of .05 to 2 μ m. See Pall Col. 2, lines 30-35. See also Pall at col. line 50-55 using cellulose acetate as substitute for porous paper. Therefore, Pall shows that porous paper filter material having the claimed pore size is practical.

The following facts have been used to establish a prima facie case of obviousness: 1) use of barrier to filter vapor smoke components that contaminate the adsorbent material and 2) the use of cellulose acetate to form that barrier. This two facts allows for a reasonable conclusion that it would have been obvious to a person of ordinary skill in the art to have conducted routine experimentation to determine the pore size of the barrier that would provide exclusion of vapor smoke components so that the filter material of the first portion is not contaminated by these vapor smoke components filtered out by the barrier.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to CARLOS LOPEZ whose telephone number is (571)272-1193. The examiner can normally be reached on Mon.-Fri. 8am - 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Crispino can be reached on 571.272.1226. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Carlos Lopez/
Primary Examiner
Art Unit 1747